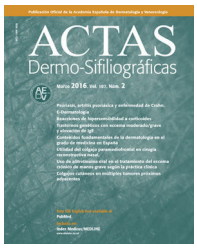
Actas Dermosifiliogr. 2019;110(8):685–686

ACTAS
Dermo-Sifiliográficas

Full English text available at
www.actasdermo.org



RESIDENT'S FORUM

Effect of Biologic Therapy on Cardiovascular Risk in Patients With Psoriasis☆

FR- Tratamientos biológicos y su efecto en el riesgo cardiovascular de los pacientes con psoriasis

Á. González-Cantero,* A.I. Sánchez-Moya, C. Pérez-Hortet

Servicio de Dermatología, Complejo Hospitalario de Toledo, Toledo, Spain

KEYWORDS
Psoriasis;
Cardiovascular disease;
Systemic therapies;
Biologic therapy

PALABRAS CLAVE
Psoriasis;
Enfermedad cardiovascular;
Tratamientos sistémicos;
Fármacos biológicos

In the last 10 years, a number of epidemiological studies have shown psoriasis, especially the severe forms, to be associated with an increased risk of death, mainly due to heart disease.[1] A recent population-based study of 8760 patients with psoriasis found that involvement of more than 10% of the body surface area was associated with a higher risk of mortality than that found in the general population (hazard ratio [HR], 2.1; 95% CI, 1.5-3.1). This increase remained significant after adjustment for traditional risk factors (HR, 1.8; 95% CI, 1.2-2.6).[2]

These findings, and the fact that we now know that inflammation plays a fundamental role in the pathogenesis of atherosclerosis,[3] have given rise to a growing interest in assessing the effect on cardiovascular risk of the systemic medications used to treat psoriasis. In a recent article published in the prestigious *Journal of the American Academy of Dermatology*, Wu et al.[4] reported the results of a population-based study (data recorded in an administrative claims database between 2000 and 2014), the objectives of which were to assess and compare the risk of major cardiovascular events and the effect of cumulative treatment exposure on cardiovascular event risk in patients with psoriasis treated with tumor necrosis factor α inhibitors (TNFi) or phototherapy. The study included 11 410 patients treated with TNFi and 12 433 treated with phototherapy. The TNFi cohort exhibited a lower cardiovascular event risk than the patients treated with phototherapy (HR, 0.87; 95% CI, 0.60-0.99; $P = .046$). The risk reduction associated with 6 months of cumulative exposure was 11.2% greater in the patients who received TNFi compared to those on phototherapy. Based on these findings, the authors estimated that treating 161 patients with TNFi rather than phototherapy would prevent 1 cardiovascular event per year.

Despite its limitations, this study makes an important contribution to the growing body of evidence on the association between TNFi therapy and a reduction in cardiovascular risk. One important study in this respect is a recent placebo-controlled clinical trial (CANTOS) that assessed the efficacy in reducing cardiovascular risk of

☆ Please cite this article as: González-Cantero Á, Sánchez-Moya AI, Pérez-Hortet C. FR- Tratamientos biológicos y su efecto en el riesgo cardiovascular de los pacientes con psoriasis. Actas Dermosifiliogr. 2019;110:685–686.

* Corresponding author.
E-mail address: Alvarogc261893@hotmail.com (Á. González-Cantero).

1578-2190/© 2019 Elsevier España, S.L.U. and AEDV. Published by Elsevier España, S.L.U. All rights reserved.

canakinumab, an interleukin-1β inhibitor biologic agent. That study, which included 10 061 patients with a history of myocardial infarction and elevated C-reactive protein levels, demonstrated—for the first time—that treatment with a biologic drug significantly reduces the number of cardiovascular events.[5] The authors of another recent study in patients with psoriasis reported a significant reduction in vascular and systemic inflammation after treatment with ustekinumab.[6] All of these findings have generated a growing interest in understanding the effect on cardiovascular risk of the systemic medications used to treat patients with psoriasis. At this point, randomized clinical trials are needed to answer the questions currently being raised in the fields of cardiology and dermatology.

Furthermore, early diagnosis of subclinical atherosclerosis in these patients would be of interest. This can be obtained using non-invasive imaging methods, such as femoral artery ultrasound, a technique that has proved useful in patients with psoriasis.[7] Using this method, we can identify patients with very high cardiovascular risk and take appropriate measures at an early stage.

References

1. Gelfand JM, Troxel AB, Lewis JD, Kurd SK, Shin DB, Wang X, et al. The risk of mortality in patients with psoriasis: Results from a population-based study. Arch Dermatol. 2007;143:1493–9, http://dx.doi.org/10.1001/archderm.143.12.1493.
2. Noe MH, Shin DB, Wan MT, Gelfand JM. Objective measures of psoriasis severity predict mortality: A prospective population-based cohort study. J Invest Dermatol. 2018;138:228–30, http://dx.doi.org/10.1016/j.jid.2017.07.841.
3. Libby P, Ridker PM, Hansson GK, Leducq Transatlantic Network on Atherothrombosis. Inflammation in atherosclerosis: From pathophysiology to practice. J Am Coll Cardiol. 2009;54:2129–38, http://dx.doi.org/10.1016/j.jacc.2009.09.009.
4. Wu F.J, Sundaram M, Cloutier M, Gauthier-Loiselle M, Guérin A, Singh R, et al. The risk of cardiovascular events in psoriasis patients treated with tumor necrosis factor-α inhibitors versus phototherapy: An observational cohort study. J Am Acad Dermatol. 2018;79:60–8, http://dx.doi.org/10.1016/j.jaad.2018.02.050.
5. Ridker PM, Everett BM, Thuren T, MacFadyen T, MacFadyen JG, Chang T, et al. Antiinflammatory therapy with canakinumab for atherosclerotic disease. N Engl J Med. 2017;377:1119–31, http://dx.doi.org/10.1056/NEJMoa1707914.
6. Kim BS, Lee WK, Pak K, Han J, Kim GW, Kim H, et al. Ustekinumab treatment is associated with decreased systemic and vascular inflammation in patients with moderate to severe psoriasis: Feasibility study using 18F-fluorodeoxyglucose positron emission tomography-computed tomography. J Am Acad Dermatol. 2018, http://dx.doi.org/10.1016/j.jaad.2018.03.011, pii: S0190-9622(18)30461-4.
7. Gonzalez-Cantero A, Gonzalez-Cantero J, Sanchez-Moya AI, Perez-Hortet C, Arias-Santiago S, Martin-Rodriguez JL, et al. Femoral artery ultrasound for improving the detection of atherosclerosis in psoriasis. J Am Acad Dermatol. 2018;80:784–6, http://dx.doi.org/10.1016/j.jaad.2018.07.007.